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ABSTRACT

This study reveals possible relationships among teachers' personality traits, situational variables, and deliberation characteristics in planning instruction. Dogmatism and locus of control perceptions were the personality traits studied, and the situations compared student teachers with elementary and secondary school teachers. Both groups were administered dogmatism and locus of control measurement scales, and were asked to "think aloud" in a process of simulated planning of instruction. Detailed written protocols of the "think aloud" process were analyzed and rated in view of characteristics derived from measuring levels of dogmatism and locus of control. Findings indicate: (1) Significant differences exist between student teachers and teachers at both the elementary and secondary levels; and (2) Dogmatism and locus of control perceptions explain variances in teachers' deliberations. Interpretations and possible implications for teacher education are put forward. (Author/FG)

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Personal Characteristics of Teachers, Situational Variables and Deliberations in Planning Instruction

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Abstract

The study is aimed at revealing possible relationships between personality traits on one hand and situational variables on the other and characteristics of teachers' deliberations in the process of planning instruction.

Groups of student-teachers and teachers were administered the Dogmatism and Locus of Control scales and were asked to "think aloud" in a process of simulated planning of instruction. Detailed written protocols of the "think aloud" process were analyzed and rated in view of characteristics derived from the concepts of Dogmatism and Locus of Control. Findings indicate: (a) significant differences between student-teachers and teachers both at the elementary and high school levels; and (b) reflection of personality traits in teachers' deliberations. Both Dogmatism and Locus of Control explain significantly variances in deliberations.

Interpretations and possible implications for teacher pre-and in-service training are put forward.

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Personal Characteristics of Teachers, Situational Variables and Deliberation in the Process of Planning Instruction

What affects teaching? Why do teachers teach as they do? These are only a few of the many questions asked with regard to the etiology of teaching behavior.

Long lists of hypothesized variables expected to explain variances in teaching behaviors have been studied. These can be reduced to two main groups: situational and personality variables, both regarded as independent and expected to predict teaching.

Until recently the educational scene was dominated by studies that investigated relationships among these independent variables, regarded as inputs and teaching behaviors as dependent variables, regarded as outputs. Intervening processes such as planning, decision making, deliberations were not studied. An analogous situation occurred in a vast amount of studies that investigated relationships among variables such as pupil characteristics and background regarded as inputs and achievement, regarded as output. The process of teaching itself remained a Black Box.

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The years 1960-1970 witnessed a research movement characterized by endeavours to uncover the veil of the teaching black box. This movement resulted in the introduction of objective instruments for observing classroom interactions in the cognitive as well as in the affective domains. The anthology "Mirrors for Behavior," edited by Simon and Boyer (1968), will serve to illustrate the point. A vast amount of research was based on these instruments (ibid.).

The present study is an additional step in revealing covert, tacit processes that are conceived as affecting the teaching act and interfere with the relationship between inputs and outputs. Such a process is teachers' thinking and deliberations in planning instruction. Studies point out that teachers' thinking and planning play an important role in predicting student cognitive and affective achievements (Marx 1978, Joyce, Morine-Dershimer 1977, Clark, Wildfong and Yinger 1978). Planning instruction is a topic to which much time and energy is devoted in teacher education, however, few studies have been conducted to reveal the extent of implementation, (Clark and Yinger 1977). Indeed, this is a very difficult task: teachers are taught how to teach, this can be evaluated since teaching is observable and in many cases

measurable. But, teachers are taught how to plan, however, planning being a tacit, unobservable process, is very difficult to analyze and to assess. For instance, studies indicate that teachers do not plan with regard to objectives, the way they had been taught to (Ben-Beretz and Kremer 1981, Zahorik 1975, MacDonald 1965, Eisner 1967). This being the case, one could ask:why devote so much time to the study of objectives? Answers to this question may be one implication derived from the study of deliberations. It was found in another study (Taylor 1970) that teachers focus on activities mainly, and that this process of decision making does not follow logically from specification of objectives. Tayor also found that those who plan ahead of teaching are insensitive to pupils as compared with those that do not plan ahead. The question is, of course, whether the planning was flexible enough as to allow for sensitivity to unforeseen events and pupil vocation. These and many other such questions necessitate investigations of teachers' planning deliberations as a basis for improving teacher pre-and in-service training.

If teacher education programs are to be built on a professional basis, planners and implementers should be aware of all variables that affect teacher behavior, so that

these may be considered and treated, especially since findings indicate that training does affect teacherdeliberations and judgments (Mondol 1973).

The aim of the present study is to go beyond already studied related variables and investigate the dependence of teachers' deliberations upon personality and situational variables. It is proposed that findings will shed some light and contribute to enrich already existing theory on one hand and yield some practical implications on the other.

The selected personality variables to be studied in relation to deliberations were Dogmatism and Locus of Control. Dogmatism refers to the extent of ability to form and synthesize conceptual systems of varying complexity, to the willingness to entertain novel, divergent ideas (Rokeach 1960). Internal and External of Locus of Control points to distinctions between social perception, with Internals depending more heavily on inner resources as compared to externals, who tend to conform to social pressures. (Phares et al 1968, Phares 1976). Internals are more active in shaping their environment, make better use of experience (Rotter 1954, 1966).

The concept of Dogmatism leads to the hypothesis that deliberations of dogmatic teachers will be more structured, convergent, principle oriented, bound to pre-conceived objectives and inflexible perception of subject matter, attaching importance to transmission of cultural heritage and to pupils' future needs. Low dogmatic teachers, on the other hand, will deliberate more flexibly, in an unstructured manner, on the basis of divergently perceived aims and subject-matter, attaching more importance to pupils needs in the present.

Hypotheses derived from the concept of Locus of control relate to the extent to which deliberations are extrinsically or intrinsically oriented from several points of view: source of suggested motivation and reinforcements; focus of aims: social, extrinsic vs. personal, intrinsic; task vs. person orientations and other aspects that may arise in the process of deliberations analysis.

The situational variables considered in this study were: (a) training institutions: university for high school teachers, teachers' colleges for elementary school teachers. The former are more subject matter and the latter more process oriented, (b) school level of teaching: high school and elementary school.

In summary: the study investigates relatio..ships between training institutions, school level, personality traits as dependent variables and teachers' deliberations in the process of planning instructions as the dependent variable.

Method

Population: 54 teachers, 110 student teachers - 64 preparing to teach at the high school level, the remaining 56 preparing to teach at the elementary school level.

Instruments

(1) D-Scale for the measurement of dogmatism (Rokeach 1960).

(2) I-E Scale for the measurement of Locus of Control based on Rotter (1954) and transformed into a 7-point interval scale to allow for independent scores on externality and internality (Levensohn 1972).

(3) Deliberations - All subjects were presented with a short story, the main idea of which is man's responsibility towards his fellow men. They were asked to plan a lesson based on this story and decide what level of pupil population the lesson was intended to ("intended population").

The directions given were as follows: "Imagine you are asked to read this story. You are free to choose pupils and grade levels. Please write down the stream of thoughts, deliberations you employ, encounter in the process of planning. Put down in words your thoughts and everything that comes to mind in the process of planning.

The written protocols of thoughts and deliberations were analyzed and rated by two indepdent judges on a 7-point scale with regard to the extent of dogmatism, internal and external locus of control, person and task orientations. Inter-judges agreement was 78%.

Findings:

A - Group differences

Groups were found to be significantly different in their deliberations as far as dogmatism, locus of control and task-person orientations are concerned.

- -

Insert Table 1 about here

- -

The table reveals similar patterns: Elementary school teachers are the less dogmatic and external and the most internal, and task-oriented person as compared with the other three groups. Student teachers, both secondary and high school - present an opposite picture: they are more dogmatic, external and the least internal and person-task oriented. Excluding dogmatism, high school teachers' position on the above variables is next to their elementary school colleagues.

B - Deliberations explained by personality variables

(1) Deliberations rated as dogmatic are significantly explained by External Locus of Control. The other variables do not predict dogmatic characteristics of deliberation to any significant degree.

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Insert Table 2 about here

- -

(2) "External deliberations" are also predicted by external locus of control, but interestingly enough, more so by the group to which subjects belong.

- -

Insert Table 3 about here

- -

(3) Internal deliberations are, as hypothesized, significantly predicted by internal locus of control. However, groups yield the highest beta weights.

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Insert Table 4 about here

- -

(4) The variances in task and person orientations are significantly predicted by background and by personality variables as well. The variance of both orientations is explained by Groups and Locus of Control. In addition, personal oriented deliberations are also explained by the "intended pupil population," and that is pupils' level for which lessons were planned.

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Insert Tables 5, 6 about here

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Discussion

The question concerning prediction of teachers' deliberations from situational and personality variables received a general affirmative answer in this study. Both groups of variables explain some of the variances in teachers' deliberations.

(a) Student teachers appear to be more dogmatic and external as compared with teachers at work. The stress and anxiety associated with entering the profession may cause student-teachers to act with regard to principles, authority and educational policy. Later on, having had some experience and assured security at work, they become less tight and free to work in a more flexible manner. Elementary school teachers are the least dogmatic and external in their deliberations, possibly as a result of educational policy and ideology of elementary school administration, which in Israel is anchored toward progressive views of education. Teachers in high schools are to a great extent achievement oriented, mainly because of the stress they experience in relation to the baccalaureat examinations, towards which they prepare their students.

(b) Of all hypothesized predictors, locus of control, both external and internal, generally has the greater beta (β) weights.

It seems quite logical that external and internal locus of control predict external and internal deliberations characteristics, it is less understandable why locus of control explains greater variance than dogmatism in dogmatic

deliberations. One could, of course, claim that both variables, which are deeply rooted in personality, meet somewhere at their roots. This is a psychological interpretation speculative in its nature and for practical purposes not even worthwhile to be further investigated. A sociological point of view may help in sheding some light on this question.

Since Locus of Control is inherently more than dogmatism related to environmental factors, and is in fact a concept derived from social theories of learning (Kelly 1967), it is only natural that various types of interactions between this personal trait and the school environment result in variances in deliberations, more than dogmatism, which is less dependent upon the immediate environment.

Another question raised by the findings in this study is: why does "group" predict internal deliberations while it does not predict the external ones? One interpretation may be related to the possibility that externality of deliberations is more linked to external influences stemming from educational policies and administration, which are the same for all, and "group" will not differentiate among them. Internal deliberations, however, are more dependent upon inner influences, hence individual differences are reflected in internal more than in external characteristics of deliberations.

The finding indicating that task and person orientations are significantly predicted not only by locus of control but also by groups (Tables 5, 6) is congruent with Fuller's theory of teachers' developmental stages. (1963). Fuller found that at the beginning of their career, teachers are concerned with themselves, later on they become task oriented and at a final stage person oriented. Indeed, student-teachers are more task than person oriented (Table 1).

From a theoretical point of view the present findings do reinforce similar studies - which indicate a relationship between various aspects of teaching and personality variables (Ager 1970, McGhee 1955, Kremer 1978, Kurtz & Kremer 1981). The discussion of practical implications should be preceded by a process of value clarification: Is internality valued more than externality? Do teacher educators have any moral justification to interfere with one's style and characteristics of deliberations? Should such an interference be considered as a violation of one's own right to be what he is. One could, of course claim that the ultimate benefit of pupils, to the extent that one has a specific and clear view on this matter, may be the source of such justifications. If such an attitude

dominates, then the question is how one can induce change? From the existing repertoire of teacher training methods, discussions based on self confrontation with one's own orientations might be helpful. The literature on self confrontation is promising in this respect (Fuller & Manning 1973).

It has also been found that in this study - Locus of Control (the most influential variable) may be affected and modified by environmental changes and enrichment programs (Mischel et al 1974, Shore et al 1971).

Various "micro-planning aloud" techniques may also prove to be helpful. However, these may be considered by some to be crude interventions and a humanist might, of course, oppose them. A solution of this dilemma will depend upon one's own views and turns the question of intervention into an intriguing field of inquiry. However, beyond various views concerning teacher pre and in-service training, teacher educators' awareness of intervening variables in teachers' deliberations in the process of planning should be an unchallenged must, and more studies are needed to uncover the veil of this process so that teacher education may profit from data on this issue.

References

Ager, M. "Dogmatism and the verbal behavior of student-teachers," Journal of Teacher Education,21, 2, 1970 (179-183).

Clark, C.M., & Yinger, R.Y. "Research on Teacher Thinking," Curriculum Inquiry, 7, 4, 1977.

Clark, C.M., Wildfong S., & Yinger, R.Y. "Identification of salient features of language art activities," Mimeographed, East Lansing, Michigan State University, 1978.

Eisner, E.W. "Educational objectives: help or hindrance?" School Review, 75, 3, 1967, (250-266).

Fuller, F.F. "Concerns of teachers - a developmental characterization," American Educational Research Journal, 1963, 2, (207-226).

Fuller, F.F. & Manning, B.A. "Self confrontation reviewed: a conceptualization for video-playback in teacher education," Review of Educational Research, 43, 4, 1973, (469-528).

Joyce, B.R. et al. "Thought and action in the classroom: The Tenth Boy Study," Mimeographed, Stanford, Calif; Stanford University, 1977.

Kelly, H.M. Attribution Theory in Social Psychology in: Levine, D. (ed.)., Nebraska Symposium on Motivation, Vol. 15, Nebraska Press 1967

Kremer, L. "Teachers' attitudes towards educational goals as reflected in classroom behavior," Journal of Educational Psychology, 70, 6, 1978, (993-997).

Levensohn, H. "Distinctions within the concept of internal-external control - Development of a new scale," Annual Convention of the APA, Proceeding, 1972, 7, (261-262).

MacDonald, J.B. "Myths about instruction" Educational Leadership, 2?, 8, 1965, (603-617).

Marx, B.W. "Teacher judgments of students' cognitive and affective outcomes," Doctoral Dissertation, Stanford University, 1978.

McGhee, H.M. "Measurement of authoritarianism and its relation to classroom behavior," Genetic Psychology Monographs, 52, 1955, (89-146).

Mischel, W. et al. :Internal-External Control and Persistence," Journal of Personality and Social Psychology, 1974, 29, (265-278).

Mondol, M.M. "The paramorphic representation of teacher decision making as a predictor of inquiry performance," Doctoral Dissertation, Michigan State University, 1973.

Phares, E.J. Locus of Control in Personality, New Jersey, General Learning Press, Morristown, 1976.

Shulman, L., Elstein, A.S. "Studies of problem solving, judgment and decision making' in: Review of Research in Education, 3, F.N. Kerlinger ed., Itaska, Ill.,F. E. Peacock, 1975.

Phares, E.Y. et al. "Internal-external control and reaction to threat," Journal of Personality and Social Psychology, 1968, 10, (402-405).

Rokeach, M. The Open and Closed Mind, New York, Basic Books, 1960.

Rotter, J.B. "Generalized expectancies for internal vs. external control of reinforcement," Psychological Monographs, 1966, 80, Whole No. 609): Social learning theory and clinical psychology, New Jersey, Englewood Cliffs, Prentice Hall, 1954.

Simon, A., & Boyer, E.G. (eds.) "Mirrors for behavior: an anthology of classroom observation instruments," Classroom Interaction Newsletter, 3, 2, 1968.

Shore, M.F. et al. "The effectiveness of an enrichment program for disadvantaged young children," American Journal of Orthopsychiatry, 1971, 41,

Taylor, P.H. How teachers plan their courses, Slough Bucks, National Foundation for Educational Research, 1970.

Zahorik, J.A. "The effect of planning on teaching," Elementary School Journal, 71, 3, 1970, (143-151).

"Teachers' planning models," Educational Leadership, 33, 2, 1975, (134-139).

Table 1

Group Differences in Deliberations

	Deliberations																			
	Dogmatic				External				Internal				Task Oriented				Person Oriented			
	$\bar{x}$	sd	SS	F	$\bar{x}$	sd	SS	F	$\bar{x}$	sd	SS	F	$\bar{x}$	sd	SS	F	$\bar{x}$	sd	SS	F
High School Teachers	3.32	1.73	54.11		2.47	1.17	24.74		3.68	1.06	20.11		4.21	1.18	25.16		3.21	1.47	39.15	
Elementary School Teachers	2.29	1.44	26.86		2.07	0.71	6.93		4.53	0.64	5.73		4.86	0.86	9.71		5.21	0.89	10.36	
				4.53*				9.38**				21.35**				54.01**				38.24**
High School Student Teachers	3.22	1.23	72.51		2.68	0.72	28.88		2.48	0.95	44.48		2.00	0.97	44.00		1.96	1.11	30.96	
Elementary School Student Teachers	3.90	1.74	154.52		3.37	1.17	72.59		2.83	1.01	53.50		2.21	0.82	3.92		1.84	0.89	29.05	
	d.f. - 3;130				d.f. - 3;134				d.f. - 3;134				d.f. - 3;125				d.f. - 3;93			

* P < 0.01

** P < 0.001

Table 2

Dogmatic Deliberation Explained
By Independent Variables

Predictors	r	R	RSQ Change	RSQ	β	F	Criterion
External L.C.	0.32	0.32	0.10	0.10	C.28		
Intended Population	0.16	0.39	0.05	0.15	0.17		
Dogmatism	0.27	0.42	0.02	0.17	0.16	2.52***	Dogmatic
Groups	0.21	0.43	0.01	0.18	0.09		Deliberations
Origin	-0.05	0.43	0.001	0.18	0.03		
Internal L.C.	-0.02	0.43	0.001	0.19	0.04		

d.f. 6:66

*** p < 0.02'

Table 3

"External"Deliberations Explained By Independent Variables

Predictors	r	R	RSQ Change	RSQ	β	F	Criterion
Groups	0.50	0.50	0.25	0.25	0.46		
External L.C	0.29	0.55	0.05	0.30	0.18		
Dogmatism	0.26	0.55	0.01	0.31	0.13	5.13***	External Deliberations
Internal L.C.	-0.01	0.56	0.00	0.31	-0.08		
Origin	-0.10	0.56	0.00	0.31	-0.04		
Intended Population	0.10	0.56	0.00	0.31	-0.01		

d.f. 6:67

*** P < 0.001

Table 4

"Internal" Deliberations Explained By Independent Variables

Predictors	r	R	RSQ Change	RSQ	β	F	Criterion
Groups	0.50	0.50	0.25	0.25	-0.45		Internal
Internal L.C.	0.13	0.54	0.04	0.29	0.20		Locus of
Intended Population	-0.27	0.55	0.01	0.30	-0.13	5.34*	Control
Dogmatism	-0.15	0.56	0.01	0.31	-0.09		Reflected
External L.C.	-0.17	0.57	0.00	0.32	-0.08		in
Origin	0.09	0.57	0.00	0.32	0.04		Deliberations

d.f. = 6:67

*$p < 0.001$

Table 5

Task Oriented Deliberations Explained By Independent Variables

Predictors	r	R	RSQ Change	RSQ	β	F	Criterion
Groups	0.66	0.66	0.44	0.44	0.61		Task
Origin	0.35	0.69	0.04	0.47	0.21		Oriented
Dogmatism	0.02	0.70	0.02	0.49	0.19	11.60*	Deliberations
External L.C.	-0.08	0.72	0.02	0.51	0.17		
Intended Population	-0.25	0.73	0.01	0.53	0.12		
Internal L.C.	0.06	0.73	0.00	0.53	0.01		

d.f. 6:62

* $p < 0.001$

Table 6

Person Oriented Deliberations Explained By Independent Variables

Predictors	r	R	RSQ Change	RSQ	β	F	Criterion
Groups	-0.49	0.49	0.24	0.24	0.40		Person
Intended Population	-0.40	0.56	0.07	0.32	-0.36		
External L.C.	-0.14	0.62	0.07	0.39	-0.23	5.24*	Oriented
Dogmatism	-0.16	0.63	0.01	0.40	-0.14		Deliberation
Internal L.C.	0.04	0.63	0.00	0.40	0.06		
Origin	0.07	0.63	0.00	0.40	-0.02		

d.f. 6:48

*P < 0.001